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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/967,287	09/28/2001	Daniel Y. Abramovitch	10010968-1	6811

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EXAMINER	
CHASE, SHELLY A	

ART UNIT	PAPER NUMBER
2133	5

DATE MAILED: 06/04/2004

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No. 09/967,287	Applicant(s) ABRAMOVITCH, DANIEL Y.
	Examiner Shelly A Chase	Art Unit 2133

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

1)☒ Responsive to communication(s) filed on *28 September 2001*.

2a)☐ This action is **FINAL**. 2b)☒ This action is non-final.

3)☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

4)☒ Claim(s) *1-49* is/are pending in the application.

4a) Of the above claim(s) _____ is/are withdrawn from consideration.

5)☒ Claim(s) *30-49* is/are allowed.

6)☒ Claim(s) *1 and 26-29* is/are rejected.

7)☒ Claim(s) *2-25* is/are objected to.

8)☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

9)☐ The specification is objected to by the Examiner.

10)☐ The drawing(s) filed on _____ is/are: a)☐ accepted or b)☐ objected to by the Examiner.

Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).

Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).

11)☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

12)☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).

a)☐ All b)☐ Some * c)☐ None of:

1.☐ Certified copies of the priority documents have been received.

2.☐ Certified copies of the priority documents have been received in Application No. _____.

3.☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

1) ☒ Notice of References Cited (PTO-892)
2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
3) ☒ Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08) Paper No(s)/Mail Date *4*.
4) ☐ Interview Summary (PTO-413) Paper No(s)/Mail Date. _____.
5) ☐ Notice of Informal Patent Application (PTO-152)
6) ☐ Other: _____.

DETAILED ACTION

1. Claims 1 to 49 are presented for examination.

2.

Information Disclosure Statement

3. The reference listed in the information disclosure statement submitted on 9-28-2001 has been considered by examiner (see attached PTO-1449).

Claim Objections

4. Claim 25 objected to because of the following informalities: please change "the selected data" to – the second selected data --- recited on line 1 to.

Appropriate correction is required.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

> (a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negatived by the manner in which the invention was made.

6. Claims **1, 26** and **27** are rejected under 35 U.S.C. 103(a) as being unpatentable over Michel et al. (USP 6658607 B1) in view of Michel et al. (USP 6591383 B1) .

Claim **1**:

Michel '607' substantially teaches a method for detecting troubles in transmission in a synchronous optical network (SONET) or a synchronous digital

hierarchy (SDH) network wherein a BIP16 procedure is applied, the method comprising: a path overhead (POH) defining a transmitted string [J1] of a predetermined length and computing a binary word of the received string (see col. 5, lines 8 to 25), interpreted as "calculating an actual value using selected data if the data pattern." Michel also teaches that a signature value [J1BIP16_SIGN] is computed from searching through N binary words of the JiBIP16_CALC data (see col. 5, lines 45 to 50), interpreted as "determining a desired value of the actual-value calculation using the selected data," and determining the expected binary word [J1BIP16_SW] for use in detecting mismatch (see col. 5, lines 60 to 65), interpreted as "determining a correction value to be applied to a portion of the selected data."

Michel '607' does not specifically teach performing an operation using the correction value to create a replacement value thereby yielding adjusted selected data; however, Michel '383' in an analogous art discloses a method for bit error rate detection wherein the error rate is determined. Michel '383' teaches that the error rate is determined by computing BIP values, comparing the computed BIP values with the expected BIP values and if an error is detected in the first pass storing the error then checking the stored error with a second expected value and if an error is detected then adjusting the BIP value (see col. 9, lines 1 et seq.). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the method of detecting troubles in transmission as taught by Michel '607' to include adjusting the BIP value after error detection as taught by Michel '383'. This modification would have been obvious because a person of ordinary skill in the art

would have been motivated to employ an improved method for detecting bit error rate in a transmission system by providing a flexible detection method as taught by Michel '383' (see col. 2, lines 5 et seq.).

As per claim **26**, Michel '607' teaches data frames according to the SONET/SDH standards using a 16 or 64 byte string (see col. 5, lines 8 to 17).

As per claim **27**, Michel '607' does not specifically teach computing an adjusted actual value; however, Michel '383' teaches that altering the parameters means setting a new threshold and the new threshold is equal to the first threshold (see col. 3, lines 57 et seq.). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify detecting error rate of Michel '607' to include altering the threshold as taught by Michel '383'. This modification would have been obvious because a person of ordinary skill in the art would have been motivated to employ an improved method providing flexibility for detecting error rate.

7. Claims **28** to **29** are rejected under 35 U.S.C. 103(a) as being unpatentable over Michel et al. '607' in view of Michel et al. '383' further in view of Diaconescu et al. (USP 6738395 B1).

As per claims **28** and **29**, Michel '607' in view of Michel '383' fails to specifically teach using an XOR operation to determine the correction value or the replacement value; however, Diaconescu in an analogous art teaches pointer processing for optical networks according to the SONET/SDH standards wherein BIP-8 computation includes XOR operations of the computed value and the expected value for a given frame (see

col. 8, lines 20 et seq.). Therefore, it would have been obvious to one having ordinary skill in the art at the time the invention was made to modify the error rate detection method of Michel '607' and Michel '383' to include the XOR operation as taught by Diaconescu since, Diaconescu teaches computation for BIP includes XOR operations. This modification would have been obvious because a person of ordinary skill in the art would have been motivated to employ a well know processing technique used of SONET/SDH frames as taught by Diaconescu (see col. 3. lines 20 to 42).

Allowable Subject Matter

8. Claims 2 to 25 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

9. Claims 30 to 49 are allowed.

10. The following is a statement of reasons for the indication of allowable subject matter: the prior art made of record teaches various configurations for detecting bit error rate according to the SONET/SDH standards for instance, the prior art made of record teaches bit error rate detection using an error detector or path overhead (POH) processor to output the data used for bit error rate detection; however, the prior art made of record fails to specifically teach the novel elements as recited in claim 30.

Specifically, the prior art made of record fails to teach or fairly suggest or render obvious "an error rate test system comprising: a pattern generator adapted to input a finite data pattern comprising at least one frame to a device under test, wherein the

device under test sequentially processes and outputs data of the input finite data pattern." Claims 31 to 49 are directly or indirectly dependent on claim 30 thus; these claims are allowable over the prior art made of record.

Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Shelly A Chase whose telephone number is 703-308-7246. The examiner can normally be reached on Mon-Thur from 8:00 am to 6:00 pm.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Albert Decady can be reached on 703-305-9595. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

Shelly A Chase